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Goddard Space Flight Center

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Inside Wallops

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NASA Honors Student Winners

Are there quakes on Mars? What's up with orbital debris? Does fire rejuvenate the landscape? Students nationwide tackled these and many other questions as part of the NASA Student Involvement Program (NSIP) academic competition.

The competition, conducted for NASA by TERC of Cambridge MA, in partnership with the Institute of Global Environmental Strategies, Arlington, VA, and WT Chen & Co., Waltham, MA, promotes critical and creative thinking in the areas of science, mathematics and technology. More than 3,600 students participated in the competition nationwide, developing and submitting entries in five competition areas: Earth Systems in My Neighborhood, Design a Mission to Mars, Watching Earth Change, Aeronautics & Space Science Journalism and Flight Opportunities.

Entries were selected for flight in two Flight Opportunities categories, Space Experiment Module (SEM) and the Sub-Orbital Space Experiment Module (Sub-SEM). The lead teacher and up to four team members for each flight-selected experiment receive an all expense-paid trip to Student Flight Week at NASA Wallops Flight Facility. Working with NASA scientists and engineers, winners in the SEM category will integrate their experiments for launch on an upcoming Space Shuttle flight.

High school students from Glenbrook North High School, Northbrook, IL, winners in the Sub-SEM category, are currently working with NASA Wallops personnel to finalize their experiment to determine the effects of Coriolis deflection on fluid flow in micro-gravity. Students from Arizona State



Photo by Rick Huey.

The Orion sounding rocket (above) launched Aug. 5, 1999 from Wallops Island carried a Sub-SEM payload.

University and the University of Alaska, Fairbanks also will have experiments on the Sub-SEM payload that is scheduled for launch from Wallops Island on an Orion sounding rocket during Student Flight Week, June 12-16. The students will begin data analysis following recovery of their experiment.

A team of Native American middle school students from Tuba City, AZ, captured the first prize in Aeronautics and Space Science Journalism with their video documentary on the 30th anniversary of the Apollo 11 lunar landing. The winners will attend NASA Space Camp in Huntsville, AL.

A complete list of NSIP high school, middle school and primary school winners and their projects can be found at: <http://www.nsip.net/>

GOES-L Weather Spacecraft Successfully Launched

The fourth in a series of five of the most sophisticated weather spacecraft ever built, soared into space May 3 from Cape Canaveral Air Force Station, FL.

The Geostationary Operational Environmental Satellite (GOES)-L spacecraft was carried in space aboard a Lockheed Martin Atlas IIA rocket.

NASA and the National Oceanic and Atmospheric Administration (NOAA) controllers are scheduled to perform several apogee motor firings and adjust maneuvers, culminating with the spacecraft arriving in a geosynchronous

orbit 22,240 miles (35,788 kilometers) above the Earth's equator. Controllers will operate the spacecraft from the NOAA Satellite Operations Control Center in Suitland, Md.

The primary objective of the GOES-L launch is to provide a full capability spacecraft in an on-orbit storage condition, to assure continuity in services from a two-spacecraft constellation.

GOES-L was built and launched for NOAA under technical guidance and project management by the NASA Goddard Space Flight Center.

Heffernan Named NASA Chief of Staff

Edward J. Heffernan has been named Chief of Staff at NASA Headquarters by Administrator Daniel S. Goldin.

As Chief of Staff, Heffernan will continue in his role as head of the Agency's legislative affairs and will also coordinate all staff activities in the immediate office of the Administrator.

Wallops Shorts..... Mutual Aid Requests

The Wallops Fire Department responded to a request for assistance with rescue attempts for a double drowning in a pond near New Church on May 1. On May 4, they assisted with a structure fire on Saxis Road.

On the Road

Dwayne Morgan, Electrical Systems Branch, took part in a Career Fair at Fruitland Intermediate School on May 5.

To the Goddard Team:

It is my great pleasure to inform you that two of the excellent contractors who support the Goddard Space Flight Center have been selected to receive NASA's George M. Low Award, the Agency's highest honor for quality and technical performance.

On April 27, at the 15th annual NASA Continual Improvement and Reinvention Conference on Quality Management in Alexandria, VA, Administrator Dan Goldin announced that Computer Sciences Corp. (CSC) Federal Sector-Civil Group won the large business service award and Jackson & Tull Aerospace Engineering won the small business service award.

Also selected for an award this year was Boeing Delta II Launch Services, who were nominated by their new customer, Kennedy Space Center, but worked with Goddard for many years.

As a reminder, Raytheon Support Services received the Award in 1999 and Allied Signal (now Honeywell) received the Award in 1998, based on Goddard's recommendations.

The Low Award is the nation's oldest award for organizational quality, and this year's selections are a great testimony to the consistently first-class work performed at our center.

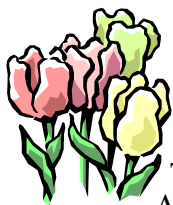
My sincere congratulations to everyone involved!

A. V. Diaz
Director

April Showers Bring May Flowers

by Ted Wilz, Senior Meteorologist

If April showers truly bring May flowers, the Eastern Shore should be in full bloom by the end of the month. The 4.28 inches of rainfall recorded in April was well above our average of 2.65 inches. This provided the wettest April on record at Wallops since 1983. Considerable cloudiness accompanied all the rain.

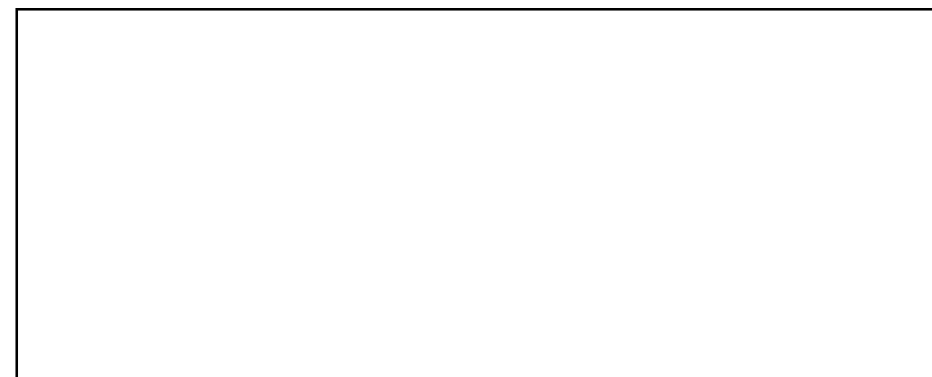


Although no new record high or low temperatures were set in April, the cloudiness contributed to temperatures being slightly (1/2 degree) below normal for the month. The warmest day of the month actually occurred rather early, April 6, when we reached a very pleasant 75 degrees. A grim reminder that winter was in the not too distant past occurred three days later on April 9 when we recorded the coolest temperature of the month at 34 degrees and also received a few snowflakes following a strong cold frontal passage.

During June, we can expect 3.11 inches of rainfall, mostly in the form of showers, which usually occurs on eight days of the month. High temperatures average in the upper 70s at the beginning of the month and average about 83 degrees by month's end. Average lows start out in the upper 50s and increase to the mid 60s as July approaches. The record high temperature for June is 96 degrees, which occurred once in 1999 and on three separate occasions in 1991. With a record low for June of 40 degrees, one can easily see the reality of the temperature extremes for the month.

June brings the end of the school year and lots of outside activities, I hesitate to remind you that it also brings the start of the hurricane season. The early forecast for the hurricane season is for another year of above average hurricane activity, though less active than the recent years of 1995, 1996, 1998 and 1999. In the Atlantic this year, we should expect 7 hurricanes (5.7 is average), 11 named storms (average is 9.3) and 3 intense (category 3-4-5) hurricanes (average is 2.2). Collectively, net tropical cyclone activity in the year 2000 is expected to be about 125 percent of the long-term average. Alberto, Beryl, Chris, Debbie, Ernesto, Florence, Gordon, Helene, Isaac, Joyce and Keith (named after one of our own in PAO) form the "tropical lineup" once the hurricane season starts.

Don't wait until Alberto threatens the Mid Atlantic coast to make necessary preparations such as plotting evacuation routes and storing food, water, batteries and clothing. Enjoy the gorgeous, balmy weather on the Eastern Shore this time of year, but at the same time, prepare for any potential weather emergency.



Jack Merrill Retires



Photo by Tom Burton.

Richard (Jack) Merrill, (above), retired on May 3, 2000 after 38 years of government service. A native of Bloxom Va., Merrill enlisted in the U.S. Coast Guard Reserve in 1965 until he retired in April 2000.

Merrill began his career at NASA Wallops in 1964 accepting a position in Mail and File. From 1966 until 1980, Merrill worked as an aerospace vehicle launcher mechanic in the Space Launch Support Section on Wallops Island. In 1980, he transferred to the Facilities Branch where he served as a Facilities Management Specialist until his retirement. Merrill has served as the technical representative on the facilities maintenance, custodial, and grounds maintenance contracts. He also was the group leader for many years with the service contracts and resources group.



Photo by Roger Mason.

Debbie Parks, Real-Time Software Engineering Branch, demonstrates the use of a "Sony Picture PC" to (left to right) Savannah Manske-East, TyAndrea Wise and Lindsey Clark during Take Our Daughters to Work Day.

WEMA/MAC News

It's that time again! Forms for cheese orders will be available, 11 a.m. to 1 p.m., May 8 through May 19, at the Wallops Exchange, Bldg. E-2. Orders may be picked up from 11 a.m. to 1 p.m., May 23 and 24 in Bldg. F-3. Payment is required at time of pickup. For additional information, call Pam Milbourne, x2020.

The NASA Day at Kings Dominion previously scheduled for July 15 has been changed to July 29, 2000. Contact Pam Milbourne, x2020 for ticket information.

Update on the Bottle Rocket Contest

The word is rapidly spreading that Team Coast Guard is building a super duper bottle rocket that's sure to take home honors in all categories of the Bottle Rocket Contest to be held at the employees picnic on May 19.

Even though Team "Cogs in the System" had the winning entry last year with SPIKE, they might need more than a working parachute system to take home top honors this year. Competition will be stiff in the Overall Looks and Aesthetics category (20 points) if the Navy pulls out their "dress blues".

Launch coordinator, Tony Goodyear, has heard from a somewhat questionable source that most of last year's entries are going to try again this year. Team "Small Shuttle Payloads" won second place last year with GUMP and was the only team deemed to be ISO compliant. They're pumped for a win this year. "Team Under Pressure" has worked on the problem they had with stability during flight (20 points). They want to do better than a 6th place finish this year.

Word has it that Team "Sub-Orbit" has a new entry. OTIOSE just didn't perform as well as expected in the altitude achievement category (up to 20 points). Team "Wallops Rocket Factory" rewrote the specs for H2R and expects to clear the launcher making some points for overall flight (20 points). This time out, Team "F-6" has appointed a Project Manager for their Black Brant XII and may even come in with a working recovery system (10 points).

The NASA teams will definitely have to rely on some fancy engineering plans to beat out Teams Coast Guard and Navy Blue. Plans for a multiple stage rocket (up to 15 points) and the safe return of the payload (egg, worth 10 points) by teams from the Virginia Space Flight Center and NOAA are being kept top secret.

The launches will be during the Wallops Partners Employee picnic, 11 a.m. to 12:30 p.m., May 19, 2000 at the softball field on the Wallops Main Base. Come out to see who goes home with bragging rights and who just goes home.

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<http://www.wff.nasa.gov>